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10/630,886	07/30/2003	Arthur R. Alexander	11279 (NCR.0111US)	7940
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			EXAMINER	
			DINH, TUAN T	
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Please find below and/or attached an Office communication concerning this application or proceeding.

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**BEFORE THE BOARD OF PATENT APPEALS
AND INTERFERENCES**

Application Number: 10/630,886
Filing Date: July 30, 2003
Appellant(s): ALEXANDER ET AL.

Harden E. Stevens, III
For Appellant

EXAMINER'S ANSWER

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This is in response to the appeal brief filed 02/27/07 appealing from the Office action
mailed 05/19/06.

(1) Real Party in Interest

A statement identifying by name the real party in interest is contained in the brief.

(2) Related Appeals and Interferences

The following are the related appeals, interferences, and judicial proceedings known to the examiner which may be related to, directly affect or be directly affected by or have a bearing on the Board's decision in the pending appeal:

(3) Status of Claims

The statement of the status of claims contained in the brief is correct.

(4) Status of Amendments After Final

The appellant's statement of the status of amendments after final rejection contained in the brief is correct.

(5) Summary of Claimed Subject Matter

The summary of claimed subject matter contained in the brief is correct.

(6) Grounds of Rejection to be Reviewed on Appeal

The appellant's statement of the grounds of rejection to be reviewed on appeal is correct.

(7) Claims Appendix

The copy of the appealed claims contained in the Appendix to the brief is correct.

(8) Evidence Relied Upon

6,153,290	Sunahara	11-2000
6,611,419	Chakravorty	8-2003

(9) Grounds of Rejection

The following ground(s) of rejection are applicable to the appealed claims:

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

1. Claim 15 is rejected under 35 U.S.C. 102(b) as being anticipated by Sunahara (U.S. Patent 6,153,290).

As to claim 15, Sunahara discloses a circuit board (1, column 5, line 31) as shown in figures 1-4 comprising:

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first and second reference plane layers (17, 14, column 5, lines 35-36);
a dielectric layer (3-7, column 5, lines 31-32) between the first and second reference plane layers (17, 14); a decoupling capacitor (10, column 5, line 33) having first and second electrodes (22, 23, column 5, line 56); and
a discrete resistive (12, column 5, line 34) having first and second electrodes, the first electrode being electrically connected to the first reference plane layer (17), the second electrode being electrically connected to the first electrode (22) of the capacitor (10), and the second electrode (23) of the capacitor (10) being electrically connected to the second reference plane layer (14).

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claim 25 is rejected under 35 U.S.C. 103(a) as being unpatentable over Sunahara (U.S. Patent 6,153,290) in view of Chakravorty (U.S. Patent 6,611,419)

As to claim 25, Sunahara discloses all of the limitations of the claimed invention as claimed in claim 15, except for the circuit board having an IC device mounted on.

Chakravorty teaches an electronic assembly comprising a multilayer substrate (210), see figure 2, having a IC die (200) mounted on.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to have an IC mounted on a circuit board, as taught by Chakravorty, employed into circuit board of Sunahara in order to provide a functionally electrical interconnection of components and a circuit board.

(10) Response to Argument

Appellant's arguments filed 02/27/07 have been fully considered but they are not persuasive.

Appellant argues:

In claim 15, the rejection under 102(b) is not proper because:

Sunahara does not show or suggest:

- (a) or (b) "first or second reference plane layers, or
- (c) a dielectric layer between the first and second reference plane layers, or
- (d) the resistor's first electrode electrically connected to the first reference plane layer, or
- (e) the decoupling capacitor's second electrode electrically connected to the second reference plane layer."

Examiner disagrees.

Response for (a) or (b), Sunahara discloses first or second wiring conductor (17, 14, column 5, line 35, and cut-side in figure 1), the wiring conductor (17, 14) formed in a laminate (9) and on inner ceramic layers (2-7). The wiring conductor formed as a layer on a planar surface or a surface plane of the ceramic layers (2, 3 and 7, 8). So, the

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wiring conductor is a wiring conductor plane layer, or plane layer. Further, the Appellant does not show a specific dimension or size (i.e width or length) of the plane layers (108, 112). Thus, Sunahara discloses the first and second reference plane layers.

Response for (c), the ceramic layers (3-7), which are dielectric material formed between the first and second plane layers (17 and 14), see figure 1.

Response to (d), the discrete resistor is made by a thick/thin film resistor as taught in so many issued Patents, for example, Petty (U.S. Patent 3,749,971) discloses a discrete resistor is formed by way of a thick film resistor, Riley (U.S. Patent 5,652,562) discloses a thick film resistor (58) being a discrete resistor.

Thus, It is clearly defined a thick film resistor as a discrete resistor in so many issued Patents from the past, and Sunahara discloses a thick film resistor (12) otherwise inherently is a discrete resistor. Further the discrete resistor has electrodes of the discrete resistor functioning as terminals or contacts for used to making contact to other. Sunahara discloses in figure 2 that the resistor (12) having two terminals connected to an electrode of a capacitor (10) and the first plane layer (17) as shown in figures 1-2 is discrete because it is a distinct part and separate resistor, therefore, it is discrete and the references show that the discrete resistor is a thick film resistor.

Response to (e), Sunahara disclose the decoupling capacitor (10) having first and second electrodes (22, 23, column 5, line 56), the second electrode of the capacitor (10) being electrically connected to the second plane layer (14).

Hence, the rejection is proper.

In claim 25, the rejection under 103(a) is not proper because:

(III) Neither Sunahara nor Chakravorty teach or suggest "a discrete resistor having first and second electrode."

Examiner disagrees because as explained above, Sunahara clearly discloses a thick film resistor as a discrete resistor.

For the above reasons, it is believed that the rejections should be sustained.

(11) Related Proceeding(s) Appendix

No decision rendered by a court or the Board is identified by the examiner in the Related Appeals and Interferences section of this examiner's answer.

Respectfully submitted,

Tuan Dinh

June 27, 2007.



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PRIMARY EXAMINER

Conferees:

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